ABSTRACT

A method and apparatus for magnetic field analysis, contributing to not only determining whether or not demagnetization would occur in a permanent magnet but also calculating its magnetic flux density distribution after the demagnetization, is provided. In a magnetic field analysis method according to the present invention, first, permeance coefficients at multiple sites in a permanent magnet and/or numerical values that are dependent on the permeance coefficients are calculated based on B-H curve data of the permanent magnet at a first temperature T1. Next, modified B-H curve data of the permanent magnet, which has been operated at a second temperature T2 that is different from the first temperature T1, are derived for the respective sites based on B-H curve data of the permanent magnet at the second temperature T2 and the permeance coefficients or the numerical values.